

MODELS: Curtiss-Wright A22, 22B and Navy SNC-1

T.C. NUMBER: 2-549

I - Model A22, 2 PCLM:

Engine	Wright R975E-3
Fuel	80 minimum octane aviation gasoline
Engine limits	Maximum, except take-off 34.5 in. Hg., 2200 rpm (420 hp) Take-off (one minute) 36.5 in. Hg., 2250 rpm (450 hp)
Airspeed limits	Level flight or climb - 170 mph True Ind. Glide or dive - 250 mph True Ind. Flaps extended - 100 mph True Ind.
C.G. range	(-51.4) (19.7 percent MAC) to (-46.8) (26.9 percent MAC)
Datum	Trailing edge of wing at root
Leveling means	Spirit level installed in front cockpit
Maximum weight	3455 lbs.
No. seats	2 (+16) and (-31)
Maximum baggage	40 lbs. (+40)
Fuel capacity	94 gallons (two tanks in wing, 33 gallons each) (-48) and two outboard wing tanks, 14 gallons each (-40)
Oil capacity	6-1/2 gallons (-81)
Serial Nos. eligible	A22-1 only
Required equipment	Items 101(a), 102(a), 103(a), 104(a) and (c), 105, 106(a), 107, 108(a), 109(a), 110(a), 111(a), 112(a)

II - Models 22B and Navy SNC-1, 1-2 PCLM (See NOTE 1)

Engine	Wright R975E-3
Fuel	80 minimum octane aviation gasoline
Engine limits	Maximum, except take-off 34.5 in. Hg., 2200 rpm (420 hp) Take-off (one minute) 36.5 in. Hg., 2250 rpm (450 hp)
Airspeed limits	Level flight or climb - 170 mph True IND. Glide or dive - 250 mph True Ind. Flaps extended - 100 mph True Ind.
C.G. range	(-51.4) (19.7 percent MAC) to (-46.8) (26.9 percent MAC)
Datum	Trailing edge of wing at root
Leveling means	Leveling lugs installed on top longeron in front cockpit
Maximum weight	3455 lbs.
No. seats	2 (+16) and (-31)
Maximum baggage	40 lbs. (+40)
Fuel capacity	66 gallons (two tanks in wing center section 33 gallons each (-48))
Oil capacity	6 gallons (-80)
Serial Nos. eligible	(Model 22B) - 3604 only (Model SNC-1) All Navy Serial Nos. per NOTE 3
Required equipment	Items 101(b), 102(b), 103(b), 104(b), and (d), 105, 106(b), 108(b), 109(b), 110(b), 111(b) and (c), 112(b), 113, 114

Specifications Pertinent to All Models:

Certification basis	Airworthiness Certificate only (CAR 04a)
Export eligibility	Eligible for export to all countries except Great Britain, Canada, Australia and New Zealand

EQUIPMENT:

Items included in required list under specifications pertinent to individual models may not be removed unless replaced by approved equivalent items. The effect upon balance of all equipment changes must be computed and the aircraft operation record revised accordingly. Values in inches shown in parenthesis after each item represent horizontal arms to the C.G. of the item measures minus (-) ahead and plus (+) to the rear of the datum. A plus(+) or minus (-) sign preceding the weight of an optional item indicates that net weight change between that item and the equivalent required item.

Propellers and Propeller Accessories	<u>A22</u>	<u>22B, SNC-1</u>
101. Propeller - metal		
(a) Controllable (Hamilton Standard hub 2D30, blades 6095-A-15) (low pitch setting 15 degrees)	155 lbs.	(-121)

	(b) Constant speed (Hamilton Standard hub 2D30, blades 6167A-15) (low pitch setting 13 degrees)	157 lbs.	--	(-121)
207.	Propeller - adjustable metal (Hamilton Standard hub 5406, blades A3A1-21)	86 lbs.	(-121)	--
Engine and Engine Accessories				
102.	Exhaust collector ring			
	(a) WAC	25 lbs.	(-111)	--
	(b) WAC SU472	27 lbs.	--	(-111)
103.	Oil cooler			
	(a) U.A.P.-3150	12 lbs.	(-91)	--
	(b) U.A.P.-3150	14 lbs.	--	(-88)
104.	Fuel pumps			
	(a) Wobble (Type D-2)	3 lbs.	(-77)	--
	(b) Wobble (U.A.P. AEL-1 fuel unit, including wobble pump)	7 lbs.	--	(-52)
	(c) Engine driven (Pesco R-400-BLE)	3 lbs.	(-87)	--
	(d) Engine driven (Pesco R-400BR)	31 lbs.	--	(-85)
111.	Hydraulic pump			
	(a) Northill 7-181-L	8 lbs.	(-39)	--
	(b) Engine driven (Pesco 204-DA)	4 lbs.	--	(-95)
	(c) Hand operated (Adel D-8109)	5 lbs.	--	(-39)
113.	Starter - hand inertia (Eclipse Series XI)	34 lbs.	--	(-83)
201.	Starter (Eclipse F-141)	25 lbs.	(-85)	--
Landing Gear				
105.	(a) 7.50-10 wheels (Goodyear 10HBM)	33 lbs.	(-67)	(-67)
	(b) 6.50-10 6-ply H.D. tires	22 lbs.	(-67)	(-67)
106.	(a) 8 in. streamline tail wheel with 6-ply tire (wheel must be placarded for Goodyear H.D. tire at 45 lbs. air pressure)	2 lbs.	(+160)	--
	(b) 10 in. smooth contour tail wheel with 6-ply H.D. tire (wheel must be placarded for this tire)	7 lbs.	--	(+165)
Electrical Equipment				
108.	Battery			
	(a) Exide 6-TS-7-1	28 lbs.	(+38)	--
	(b) Exide 6-TS-7B	25 lbs.	--	(+56)
109.	Generator			
	(a) Eclipse type G-2	22 lbs.	(-85)	--
	(b) Eclipse 703-3	23 lbs.	--	(-85)
110.	Generator control box			
	(a) Eclipse CB-666	5 lbs.	(-77)	--
	(b) Eclipse G-24A	6 lbs.	--	(-10)
116.	Landing lights - two (Grimes ST-1220)	10 lbs.	--	(-38)
Interior Equipment				
107.	Tell-tale signal system	2 lbs.	(-40)	--
112.	Instruments			
	(a)	8 lbs.	(-40)	--
	(b) Front cockpit	17 lbs.	--	(-60)
	Rear cockpit	11 lbs.	--	(-6)
114.	Vacuum pump (Pesco B-2A)	4 lbs.	--	(-84)
115.	Pressure fire extinguisher (5 lbs. CO-2 type)	20 lbs.	--	(-69)
202.	Cabin heater	6 lbs.	(-98)	--
203.	Pressure fire extinguisher	18 lbs.	(-72)	--
205.	Vacuum pump (Eclipse AP-8)	7 lbs.	(-90)	--
206.	Extra instruments	20 lbs.	(-40)	--
208.	Flares - two (Wiley A-8)	34 lbs.	--	(+67)

NOTE 1. For the Model 22B, Serial No. 3604, the following placards are to be posted in full view of the pilot:
 "WITH PASSENGER - MAXIMUM FUEL 63 GALS.: NO BAGGAGE, FLARES, RADIO TRANSMITTER OR POWER UNIT SHALL BE CARRIED. WITHOUT PASSENGER - FULL FUEL, ALL EQUIPMENT AND 40 LBS. MAXIMUM BAGGAGE MAY BE CARRIED."

"SOLO FROM FRONT SEAT ONLY."

For SNC-1 airplanes, placards covering loading schedules will be determined by the individual airplane weight and balance report. Post in full view of the pilot, also, the following: "SOLO FROM FRONT SEAT ONLY."

- NOTE 2. Navy Model SNC-1 eligible when following changes are made:
- (a) Rudder to be revised in accordance with Curtiss-Wright Drawing 19-14-02.
 - (b) Check to assure pilots cabin enclosure is in accordance with Curtiss-Wright Drawing 22-251-01.
 - (c) Relocate master battery switch to be close to battery and make this switch operable to pilot in flight.
 - (d) Install fire resistant bulkheads for leading edge of wing in engine compartment.